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Pre-Marital Test of Genetic Compatibility for Effective Child Health: An Islamic Perspective

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ABSTRACT

Debates on pre-marital genotype compatibility test for effective child health has received much attention in recent times among medical practitioners, biological scientists and Islamic Scholars. However, some marriage counselors, religious leaders, followers and even prospective spouses have questioned such medical recommendation as unnecessary due to its limitation of the natural laws of love and religion. Some claim, with legitimate authority that it contradicts the Islamic etiquettes of spouse selection and marriage approval. This study therefore, intends to examine the argument against pre-marital test of genetic compatibility with the views of its protagonists. The study revealed that, Islamic teachings offer a great deal in the prevention and control of genetic diseases to Islamic community. In Islam any measure or step that is taken to safe guard the health and to give it an immunity against any negative force external or internal as long as that measure is not contrary to the teaching of Shari'ah is lawful consider the following. It is recommended that, Pre-marital examination should be encouraged which may detect the trait in those intending to get married. And that governments and Islamic institutions spread understanding of the importance of premarital genetic tests and encourage their use. The paper concluded that, healthy living is part and parcel of Islam, introduced with the inception of Islam more than 14 centuries ago.

Keywords: pre-marital, genetic compatibility, child health, Islamic

INTRODUCTION

Genetics is the scientific study of heredity and variation ^{1}. Genotype is also, a term used to describe the sum of all the genes in an individual [2]. Likewise, it is a branch of biology dealing with heredity and variation: inherited characteristics of an organism; origin: development, genetic code: the system by which genes pass on instruction that ensures transmission of hereditary character [3], the science that accounts for natural difference and resemblances among organisms related by descent and the study of heredity and its variation [4]. In simplest terms therefore, it means the study of the reasons why people look similarly and differently. In relation to this discourse, it denotes reason(s) why there can be scientific approval or disapproval between a male and female proposing marriage due to possible genotype of their child (ren). Humans, like every other creature are composed of millions of genes; each of which expresses a particular trait in such individuals. This includes colours of the skin, height, blood group, [5,6] genotype e.t.c. Children born of a parent will have different genotype. Exceptions are seen in cases of twins or multiple births that are fertilized from the same egg. Human beings have two alleles with each pair inherited from each parent; an allele represents a gene [6].

However, before the advent of modern medicine, there was high mortality and infant death rates. All these happened because there was no knowledge on blood group or genotype. As a result, people that get married irrespective of their genetic makeup should not be blamed for their ignorance. But with the advent of modern medicine, biological explanations are now being made on the causes of infant death rate; this led to the discovery of sickle cells.

However, one of the blessings of Islam is that it never abstracts scientific programs or narrows the scope of the mind in the field of science and technology. That is why the Glorious Qur'an and *Ahadith* have revealed absolute facts about genetics in its true perspective over 1400 years ago.

Mankind, fear your Lord, who created you of a single soul, and from it created its mate, and from the pair of them scattered abroad many men and women; and fear God by whom you demand one of another, and the wombs; surely God ever watches over you (Qur'an, 4:1).

In another verse, He says: O humanity! Adhere to the Laws of your Sustainer who initiated your creation with a single life-cell ^[6] which split into two parts- one male and the other female - and through them spread so many men and women in the world and follow the Laws of *Niz'am-e-Rabubiyyat*.

The first step, while establishing this *Niz'am*, would be with your own kith and kin and if you succeed in doing this, you will see how Allah's Laws continue in keeping watch over you!. And

"Was he not a sperm-drop spilled? Then he was a blood-clot, and He created and formed, and He made of him two kinds, male and female" (Qur'an 23: 12-14)

Then in the mother's womb He formed it into an embryo that was suspended and by various combinations, and fashioned it into an excellently proportioned shape; Due to its distinction into sexes, male and female were paired.

We created man of an extraction of clay, then We set him, a drop, in a receptacle secure, then We created of the drop a clot then We created of the clot a tissue then We created of the tissue bones then We garmented the bones in flesh; thereafter We produced him as another creature. So blessed be God, the fairest of creators! (Qur'an, 32: 12)

The great possibilities which Allah's Law of creation has: We created man of a sperm-drop, a mingling, and we made him hearing, seeing.) (Qur'an, 76: 1-2) It is a fact that the human being was for a long time not something which could exist on its own. During this process, one of the stages was the initiation of his creation from a sperm. It was a collection of numerous mixed potentialities; and so we made arrangements whereby his latent potentialities would develop gradually. For this, while in the mother's womb, it underwent many changes till it became a human being capable of hearing and seeing.

He created you of a single soul, then from it He appointed its mate; and He sent down to you of the cattle eight couples. He creates you in your mother's wombs creation after creation in threefold shadow. (Qur'an, 9:6)

He initiated your creation from a single living cell and then caused it to split into two parts, one becoming the male and the other female. He also created eight types of cattle. When you are still in the mother's womb, He fashions you, inculcating creative changes in different stages^[7]. These changes constitute one act of creation after another; and all this takes place under three veils of darkness. This then is your Allah, according to Whose Laws of *Rabubiyyat* your development and nourishment take place. He alone wields total authority and power in the universe. No one else has such power or authority.

O Man! What deceived thee as to thy generous Lord who created thee and

shaped thee and wrought thee in symmetry and composed thee after what form He would? (Qur'an, 82: 6-8)

In Islamic perspective, there are references in the Sunnah to several different specific single gene mechanisms, namely both recessive and dominant inheritance. A potential allusion to recessive inheritance would appear to exist in the following Hadith:

"A Man came to the prophet (SAW) and said: O Allah's Messenger! A Black child has been born for me, the prophet (SAW) asked him, and have you got camels? The man said, yes, the prophet (SAW) asked him, what color they? The man replied: Red. The prophet (SAW) said: Is there a grey one among them? The man replied, yes the prophet (SAW) said: Whence comes that? He said: May be it is because of heredity. The prophet (SAW) said: may be your latest son has this color because of heredity [8].

Two conclusions can be drawn from this Hadith: the laws of heredity are similar between man and animals and a characteristic which becomes hidden for several generations may appear again in the future.

The Hadith of the Prophet said: "Oh, Allah, make us enjoy our hearing, our vision, our strengths, as on as we live, and make it our inheritor" [9, 48]. Also, the Prophet Mohammed (SAW) had said years ago that every foetus picks up genetic traits by moving along its generational lineage, maternally and paternally, it picks up whichever Allah had destined it to pick and this trait undergoes transformation until its birth [10].

Scientifically, this can be interpreted as the changes that sometimes occur in the genetic traits of a foetus and the baby when born.

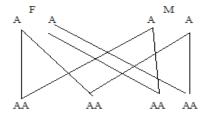
Hence, there are four genotypes in humans: AA, AS, SS and AC. AC genotype is not so common and popular unlike the other three. SS and AC are the abnormal genotypes or the sickle cells as the society no long provides excuse for this ignorance. The knowledge of genotype is important when choosing life partners. Intending couples should know both their own genotype as well as their partner's genotype at the early stage of their relationship before they are well rooted in love and emotions. Emotions and time spent in the relationship can cloud people's judgment or decision to break up if they are not compatible, thus, giving birth to sickle cell children and subjecting themselves and their children to pain, torture and agony.

AN EXPLANATION OF GENOTYPE IN REPRODUCTION

Human genotype is classified as AA, AS or SS based on the dominant and recessive genes respectively. Dominant gene is the gene expressed outwardly by an individual Recessive gene is the gene present in an individual but is not expressed; it may be expressed at any future time. Therefore every individual belongs to any of these genotypes depending on the combination of genes from the parents. Medically speaking, children are believed to have inherited their genotypes from their parents throughout life and that the only means of transferring sickle cell marker is from parents to children at conception [11]. Cases of sickle cell disease in children have been traced to the donation of haemoglobin gene from the father and the mother. Each of these genotypes has its advantage and disadvantage; however, one is more severe than the others.

The AA genotype otherwise called a noncarrier. Has the advantage of being free to marry any other genotype since they cannot produce an SS offspring. However, they are more prone to malaria attack which is the most deadly disease in sub-Saharan Africa [12]. This is because they lack the recessive sickle cell which helps to encapsulate the malaria parasite [13]. The AS genotype otherwise called the carrier; has the advantage of being resistant to malaria attacks due to its recessive sickle cell which helps minimize malaria attacks [14,19]. This genotype is disadvantaged because they are usually advised not to marry an SS person; they are also at risk of their offspring being SS if they marry another AS person. It's best they marry an AA. The SS genotype; otherwise called the sickle cell genotype is composed of dominant and recessive sickle cell genes. Its candidates lack adequate immunity and are susceptible to many diseases easily. Their prevalence may lead to a weak population, though some are healthy looking and have a high vigor. It's possible to reduce these candidates among the humanity. An SS person is strictly advised to marry an AA person to prevent the risk of reproducing an SS progeny. A clarification of these could be made through this illustration.

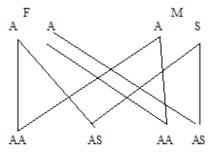
Fig. 1



From the above illustration, the father (F) with normal haemoglobin and the mother (M) with

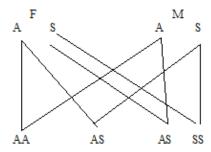
normal haemoglobin are genetically compatible; hence all the children will have genotype AA.

Fig. 11



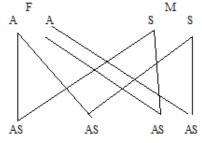
From Fig II above, the father has normal haemoglobin (AA), while the mother has sickle cell trait (AS). In this case, the children will have either genotypes AA (normal) or AS (sickle cell trait). In other words, the children may be AA or AS, or some may be AA, while others are AS.

Fig. III



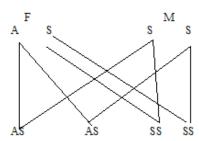
In fig. Ill above, both the father and the mother have sickle cell trait (AS), Here, there is 50% chance of the children having sickle cell carrier (that is, AS), 25% AA and 25% SS. As God will have it, all the children may be AA. AS. or SS in different proportions.

Fig. IV



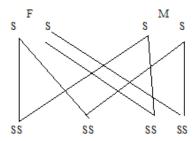
In fig. IV above, the father has normal haemoglobin (AA), while the mother is a pure sickler (SS). There is 100 percent assurance that all the children are carriers of sickle cell as they have the haemoglobin gene one each from both parents.

Fig. V



In the figure above, the father has the trait of sickle cell (AS), while the mother is a sickler (SS). Here, the possibility of the children being AS or SS is high; or rather some can be SS. while some are AS. Further still, it may not be outrageous to see all the children SS or AS.

Fig.VI



In the above figure, it is clear that a sickle cell father and a sickle cell mother combine together to give birth to nothing but sickle cell children and this may be calamitous.

It is cleared from the above illustration that, a haemoglobin gene could be normal or abnormal, and each individual has two. A carrier of normal one has two AA, while those carrying one normal and one abnormal haemoglobin have sickle cell trait AS. Those with two abnormal haemoglobin have sickle cell disease SS.

PRE-MARITAL GENETIC COMPATIBILITY TEST IN ISLAMIC POINT OF VIEW

Genotype is one of those current medical issues that are new to the Muslim life. In the early days of Islam, there was no instrument to test the genetic compatibility of people before marriage. Hence, the question does not arise of any need to do such tests. Therefore, nowadays, Muslim scholars and researchers strived to conduct researches on the issue in order to arrive at a legal position in the light of Islamic Shari'ah; either at the individual or at the institutional levels. This was done through the applications of sound Islamic objectives that guarantee and maintain the interest of the individual, as well as the community. Due to the fact, that genotype test is subjected to *ijtihad* (exertion of mental energy in the search for legal opinion),

therefore, no clear-cut text to fall back onto. This made it an issue of difference in opinion among Muslim scholars and researchers, who, in turn, were divided into two groups of opinions: those who throw legal support as to its permissibility while the other group sees it as illegal.

ARGUMENT AGAINST PRE-MARITAL TEST OF GENETIC COMPATIBILITY

It is apposite to examine the argument against premarital test of genetic compatibility with a view to comparing these with the views of its protagonist, to enable us arrive at balanced points. However, those who against it based their prohibition on a number of evidences from the Glorious Qur'an, *Ahadith* and logical evidences, such as:

- 1. Some are of the thought that early Muslims do not conduct such tests and they have good and healthy families ^[15].
- 2. They argued that in Islam, the conditions to marriage do not include genotype test as the Prophet (SAW) did not include in pre-marital prescriptions. He (SAW) said people marry a woman because of any of four reasons; beauty, background, wealth, or faith [16]. He advised the best is to choose who is religious. By religious is meant God-fearing. He admonished not marry because of those things because they fade away with time. Hence choosing anyone who is a Muslim should be considered good enough. The point here is that a would-be should not put genotype at the front banner of their marriage to the point that it tells if they will marry or not [17].
- 3. Some rests on the belief that "Wherever a man puts his faith on God and belief, that's where he shall find him". Hence, if one belief any human invention would limit one's freedom of choice; hence, one has placed his/her believe on such invention at the expense of total reliance on Allah's power [18].
- 4. Some of them, especially those scientifically learned usually assert that there are many other diseases that are deadlier and riskier than the sickle cell disease, hence, why the noise about sickle cell which results by marrying a non-genetically compatible spouse [19].
- 5. They also argued that, what Prophet Mohammed (SAW) recommended before any decision is made is *Istikharah*, including marriage and not medical test for genetic compatibility. This alone will do as Allah suffices for all ^[20].
- 6. They also maintained that, marital challenges are bigger than genotype issues. It is faith, love and responsibility that will stand the tests and trials of marriage. They added that, although the prospective couple can do genotype test only to know their status but not to determine the marriage possibility or not^[21].

- 7. In another argument they said that, people should not say that it is because of SS that a child or two will die or has died Allah alone determines that. He has already told us as: We shall test the you with something of fear, hunger, loss of wealth, lives and fruits, but give glad tidings to the patient (Q2: 155). This is so because even one who belongs to AA genotype cannot boast of living beyond any particular age nor can the father and mother claim such. So why not leave things to Allah?. Conduct of such tests may be an investigation of the *ghaibb* of Allah that is, things that are hidden; hence, it should be discouraged [22].
- 8. Among those who disproof of this medical test is Ibn Baaz (RTA). He said it negates total reliance on Allah. He also said that the result could sometimes produce faulty results ^[23]. This stand point of his is not borne out of mere dislike for science but one may infer he fear humans not to over rely on this at the expense of God's spouse selection procedures.
- 9. They argued further that, there are many doctors who died of malaria fever. Sailors have died in water. Hunters have died in the forest while hunting. And professional drivers have died while plying their trade: driving. And so will all of people one day or another [24].
- 10. They also maintained that, there is no fault in Allah's creation and that Allah gave man the purest and best nature. Perfection and balance are evident in mans' physical, mental and spiritual composition (Qur'an 82:6-8). They claimed further that while focusing on the physical aspect of man, one needs only to study the systems of the body to comprehend the significance of these verses and the wonder of Allah's creation. The human body is composed of a number of specialized systems: the digestive system. the respiratory system, the nervous system, the muscular system, the blood circulation system, the skeleton, the skin, the senses, the immune system, and so forth. Each one of these systems is miraculous in nature and more amazing than any scientific advancement that man can achieve. Therefore, the assumption behind pre-marital test is that the body is not "perfect" enough to withstand infectious diseases, implying that somehow Allah did not complete his job or carry it out well enough, that the immune system is faulty and needs correction, that people is somehow flawed, incomplete, and in need of human intervention to survive [25].
- 11. They also claimed that Allah not only created men in the finest form, but He also gave man the tools to maintain this form to assist him in its self-actualization. Men are warned that their body and health are gifts from Allah and that they will be held accountable on the Day of Judgment for them. The Prophet (SAW) informed , "Every servant of Allah

will remain standing before Allah on the day of Judgment until he has answered five questions about five things: how he spent his life, how much he acted upon his knowledge, how he acquired his wealth and how he spent it, and how he used his health and his body" [26]. The Prophet (SAW) also said, "There are two blessings which many people lose: (They are) health and free time for doing well [27]. Therefore, it is incumbent upon a Muslim to take care of his body to the best of his ability and to follow what Allah has ordained in this regard. The provisions of Allah are many. A mother is instructed to nurse her child from the moment of birth. Allah says "Mothers shall nurse their children two complete years for whoever wishes to complete the nursing (period). (Qur'an 2:233). Breast milk has been found to be the most beneficial substance for a baby and contains much more nutrients than any artificial products. It also provides antibodies, strengthens the immune system, and protects the child from many diseases. This is a wondrous gift that gives an already healthy baby an even healthier start in life. Muslims are instructed to eat from the good and lawful food of the earth. (Qur'an 5:4 and 2:168) [28]

Also, the use of honey, black seed, dates, olive oil, etc., is encouraged to prevent illness and provide cure when the need arises. The type of food intake can affect the body systems, oftentimes in very insidious ways. Other provisions that Allah has given men include the command to avoid alcohol and indiscriminate drugs, which can lead to serious consequences (health-related and others). Adultery and fornication are forbidden. They often cause various types of sexually transmitted diseases [29]. Pork and pork products, which may lead to various illnesses, are also not allowed. The meaning of these in relation to genotype according to them is that genotype test is really unnecessary. For one who follows the commands of Allah, the chances of having long-term health will be increased. Even if a disease is contacted, the person with a strong immune system will likely be able to combat it. This in turn, will strengthen the immune system more and give life-long immunity against that particular disease [30].

12. Finally, they said that, one often forgets that whatever befalls man is to the will and power of Allah. "And there is not a thing, but the supplies for it are with Us, and We do not send it down but in a known measure. (15:21). Therefore, if anybody is to experience an illness, this is from the decree of Allah; if he is to be cured from it, this is also from the decree of Allah. To rely upon humans to somehow prevent or cure without trusting in Allah is a sign of weakness of faith. Whatever good or bad that happens to man he should say "Alhamdulillah" because it is from Allah who has decreed it for some

reason (either as a test or as punishment). Allah says, (Qur'an 64:11): Men should rely upon Allah and ask Him to assist them in their times of need. The use of supplication to Allah is much more powerful than any medicine that is available because Allah is the only One Who can send the cure [31].

ARGUMENT IN SUPPORT OF PRE-MARITAL TEST OF GENETIC COMPATIBILITY

Having examined the argument against pre-marital test of genetic compatibility, we shall now examine the argument in support it with a view to determining its compatibility with Islam.

However, the proponents see the legality of the pre-marital test as does not negate total reliance on Allah nor does it contradict the *Shar'iah* of Islam because it's a way of taking to means and preventing unnecessary trial for instance:

- 1. They argued that, Umar bn Khatob said "when plague empted in Shaam; I run away from the decree of Allah to the decree of Allah" [32]. Perhaps this is the closest prevention. That is running away from something which could cause problem to ones future progeny and lead to trial of one's faith and marriage.
- 2. They also said that, Prophet Mohammed (SAW) advised that we should preserve our progeny from the five necessities; Religion, intelligence, dignity, property and life [33,38].

Hence, an SS progeny that may result from such union may have his/her live under medical threat; his/her dignity may be shaky if not well orientated and perhaps ignorance of the associated medical challenges may lead to a test of faith by seeking help from where Allah doesn't approve of thereby unprotect one's faith [34].

- 3. In another argument they said that, Prophet Zakariyyah (ASW) said "My Lord grant me from yourself a good offspring (Q 3 vs. 38). A good offspring is a relative phrase; however, an offspring whose health is shaky is preventable by simply obliging to genetic compatibility. Good health and high survival rate is among qualities of good offspring which is realizable through genetic compatibility [35].
- 4. They maintained that, Muslims supplicate 'Our Lord! Bestow on us from among our wives and our offspring who will be the comfort of our eyes (Q, 25 VS 74). Based on these, nothing prevents one from ensuring a pure, sound family which is free (or risk reduced) from defects or diseases. Hence, prior to marriage and the need for this supplication, one may reduce the risk of putting his or her selves to unnecessary and avoidable trial by not endangering the lives of our offspring [36].

- 5. In another point, the prophet Mohammed (SAW) urged men to choose spouse from a family whose women were known for given birth. On this he (SAW) said 'marry the fertile, the favorably disposed, loving women for indeed my *ummah* will outnumber other nations ^[37]. Based on this proof, one may relate spouse selection is important to ensure sound and pure progeny.
- 6. Also, on the authority of Abu Hurayrah (RTA); A man proposed to a woman then the Prophet (SAW) said 'look at her very well for indeed there is indeed something in the eyes of Ansaar Muslims' [38, 41]. This may be related here as being a need to look beyond the religion and physical attraction because the woman in question here is a Muslim and the thing in her eye isn't necessarily a defect but what he (SAW) felt may lead to a loss or reduction of his love towards her. A genotype test to proof compatibility can therefore be related as a means of investigating the things that may lead to a reduction in the love of prospective couple [39].
- 7. They said that, its better for things to happen naturally than to invite them into once lives. Doctors that died of malaria would be very few, because its one in a million, but the children that have died through the genotype and blood group are uncountable. Its not easy for somebody to know he or her child could die at anytime [40].
- 8. They wonder why people push everything to God when God had already given everybody thinking faculty, He made them to know right from left, and gave them free will to decide. Destiny only comes after one have already taken all necessary precautions against odd, or all necessary efforts towards even, what happen afterwards if not favourable could then be referred to as destiny. Otherwise, it is the destiny of which all are the architect. Everybody should not forget the saying of the prophet: "Make a good choice for your sperm, for the diseases of the blood are heritable" [41]. It is better to avoid a *fitnah* when it is avoidable [42].
- 9. They also maintained that, as for having a test before marriage to check the harmony of blood groups between the fiancé and fiancée for the sake of good and healthy offspring, there is no harm as long as such an action is done under control of reliable medical authorities. Since the Prophet Mohammed (SAW) advised that adequate investigations should be made about the family history and virtues of the person one intends to marry [43].
- 10. It needs to be mentioned that the mother's womb is the first environment of the child. The Prophet thus warned that Muslims should seriously give this its rightful consideration. He declared: "Be selective of where you drop your sperm and do not drop it except in its equals (*akfai*)" [44], which is "a position in which

one thing is equal to another thing"^[45]. Hence, *al-kafa* 'ah can summarily be put as equality.

11. Finally, they argued that, a couple who might produce an SS offspring that wed due to love may have that love gradually diminished if they produce such child. High cost of medical management of the child and the doubt of the life of such child may make them devote more attention than necessary on the child. This may lead them to shirk thereby seeking help from where it's ungodly. Adultery with genotypically compatible persons may also result due to the fear of further SS progenies with one's spouse or to compensate for one's denied love life. Also, other children may be deprived their time and needs in order to satisfy the SS child (ren), hence, injustice from the parent to their children. This may lead to unnecessary jealousy or hatred in such a family [46].

OBSERVATIONS

From the foregoing, two arguments have been examined on the pre-marital test of genetic compatibility by way of determining its compatibility with Islamic teachings. In the first instance, from an Islamic perspective health is viewed as one of the greatest blessings that God has bestowed on mankind. It should be noted that the greatest blessing after belief is health, as narrated in the following Hadith:

The final messenger of God, Prophet Muhammad (SAW) mounted the pulpit, then wept and said, "Ask Allah for forgiveness and health, for after being granted certainty, one is given nothing better than health. [47]

In another Hadith, the Prophet Muhammad (SAW) said:

No one will be allowed to move from his position on the Day of Judgement until he has been asked how he spent his life, how he used his knowledge, how he earnt and spent his money and in what pursuits he used his health [48]

The preservation of this blessing can only be achieved through taking good care of one's health and taking every measure to maintain and enhance it. With this in mind every Muslim should make sure they undertake all necessary actions which are conducive to the preservation of good health. Healthy living is part and parcel of Islam, introduced with the inception of Islam more than 14 centuries ago.

The concept preventive medicine, *tibb* wiqa'i, is a series of pro-active measures that subsumed under the Islamic concept of prevention, wiqayat. The Qur'an has used the concept of wiqaya as taking preventive and anticipatory action against punishment (2:201, 3:16), greed (59:9, 64:16), bad acts (40:9, 40:45), injury/harm, (16:81), jealousy,

oppressive rulers (3:28), annoyance (16:81), and heat (16:81). Prevention is therefore one of the fixed laws in the universe. Its application to medicine therefore becomes most obvious.

However, the concept of prevention does not involve claiming to know the future or the unseen or even trying to reverse pre-destination, qadar. The human using limited empirical knowledge attempts to extrapolate, anticipate, and predict disease risk from the known distribution of risk factors. Preventive action is modification, alleviation, or reversal of the effects of risk factors. Prevention, besides avoiding any act that can hurt good health or destroy life, halaaq (4:176, 67:28), also embraces activities that promote good health like physical exercise; rest; recreation; good diet; meditation, dhikr llah; and positive social relations. These activities and states of being are part of preventive medicine because they put the body in the best possible status to be able to fight and overcome any disease that occurs [49, 55].

Also, health in Islam is more than the apparent absence of physical ailment as man is made up two components that are intricately interwoven; they are physical and spiritual components (Qur'an 38:71-2). In a Hadith it is reported that, some Bedouins asked of the Prophet (S.A.W.) that: "Should we look for medicine (because of sickness) O Allah's Messenger?". He answered that: "Do look for medicine (medical attention), for there is no illness created by Allah without a counter acting medicine for it except old age [50]." In another hadith the Prophet (SAW) said: "No disease sent down by Allah without a cure for it equally sent down by Allah [51]."

The above given narrations of the *ahadith* of Prophet (SAW) and of the others of similar importance not mentioned here are categorically clear about the legitimacy of looking for medicine when the need arises. In this hadith, there is lawfulness of looking for medicine for medicine and utilisation it ^[52]. This is a (clear) response against the Sufis who say that for a person to be a *Wali* "Saint" he has to be pleased for whatever calamity or sickness that befalls him (as a mark of total submission to Allah) and it is forbidden for him to look for medicine.

Also, the Qur'an stresses the fact that wives are as a tilt unto their husband, which should be approached when, and how they will (Qur'an 2;223). However, we are contended to believe that a seed is sowed in order to reap the harvest; hence the need to choose an appropriate time and mode of cultivation. A serious and wise farmer will not "sow out of season nor cultivate in a manner which will injure or exhaust the soil" [53]. The Islamic Jurisprudence Council of the Islamic World League (Organization of Islamic countries) in Makkah Al-Mukarama in its 17th

session (19 - 23 10.1424 H /13 - 17 December 2003 CE) [54] having looked into the legitimacy of premarital medical screening of Genetic Blood Disorders, and has decided:

- 1. The marriage wedlock contract is governed by conditions of the *Sharia*, from which legal consequences follow. Thus, additional conditions, such as enforcing pre-marital medical screening, are not permissible under the *Sharia*.
- 2. The Council recommends that governments and Islamic institutions spread understanding of the importance of pre-marital genetic tests and encourage their use. They should facilitate such tests for those who wish to use them, while ensuring confidentiality so the results are not revealed except to the persons concerned. Pre-pregnancy genetic screening could only be done if a genetic disorder is known in a family, and the mutation for such disorder is already known. Population wide pre-pregnancy carrier screening is possible, if the carriers' mutations are known in the population for common genetic disorders like Tay-Sachs disease in the West. We have some experience with carrier screening for some of the common disorders in certain families in Saudi Arabia, for which pre-pregnancy screening is possible [49, 55].

RECOMMENDATIONS

Being an SS does not limit one's potential to attain one's dream in life. If properly managed and with God's help, the life of an SS offspring can be as long as God will just like any other genotype. Proper recognition of the need for and provision of proper care for an SS is mandatory on the parent, siblings and friends of such SS candidate. Since the genotype of such being is not a choice of his/her, we must not by any mean subject them to any form of discrimination but rather support them adequately.

Knowledge of the proper management of SS candidate should be sought by everybody all; the proper lifestyle and management of such individuals should be friendly learnt to help properly if the need arise.

We all need to think as lovers, guide as friends, advice as parents and discourage as religious leaders any relationship that may increase this preventable health condition and encourage genotype and other medical tests prior to marriage to reduce, if not totally eliminate this preventable genotype class.

Also, the sickle cell progenies aren't a source of contagious disease, but since the bitter experience such progenies may undergo is preventable through genotype compatible marriages, its wiser to prevent such diseased condition among ones possible progenies than allow them undergo life pains which may prevent them from being the comfort of one's

eye. Also, an SS offspring may not be happy with his/her parent especially if he/she realizes they could have prevented him/her from such ugly life experience. Our forefathers and parents may claim ignorance of this phenomenon but you and I in this present generation cannot afford to give an emotional love urge a priority above its possible future consequence. Pay a visit to the sickle cell care unit of a teaching or general hospital around you to imagine what your blind choice today may result into tomorrow.

There are numerous quotations in the Glorious Qur'an and *hadith* that supports the fact that one should not do anything that would harm others. Succinctly speaking, an SS offspring from a lovely couple may be harmed by their love. Such offspring may fall sick and feel pain more than others; this is a harm each of the parents could have avoided by compatible spouse selection. Ignorance may not be an acceptable excuse on us in this present generation due to the information readily available on this issue and the visible candidates around us.

CONCLUSION

The study revealed that, Islamic teachings offer a great deal in the prevention and control of genetic diseases to Islamic community. In Islam any measure or step that is taken to safe guard the health and to give it immunity against any negative force external or internal as long as that measure is not contrary to the teaching of Shariah is lawful. It is recommended tha, Pre-marital examination should be encouraged which may detect the trait in those intending to get married. And that governments and Islamic institutions spread understanding of the importance of pre-marital genetic tests and encourage their use. The paper concluded that, Healthy living is part and parcel of Islam, introduced with the inception of Islam more than 14 centuries ago. And the Prophet Mohammed (SAW) has advised that adequate investigations should be made about the family history and virtues of the person one intends to marry. Therefore, there is no harm in pre-marital genetic compatibility test for the sake of good and healthy offspring.

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